

**KPMG Construction Cost Review  
Cal State Fullerton – FU-002  
Student Housing**

---

**PROJECT OVERVIEW**

The California State University (CSU), Office of the University Auditor, retained KPMG to perform a review of the new Fullerton Student Housing (CSUF) project. The project consisted of 110 living units with 4-single occupancy rooms for a total of 440 beds.

Total size of the project was approximately 136,000 gross square feet. The housing portion of the project was arranged in five 4-story buildings, each building consisting of 22 units (88 beds). The housing component represented approximately 107,000 gross square feet. The project also included reconfiguration of the existing common space, renovation of office and maintenance space located in or near Cypress Hall, new administration and maintenance buildings, extensive on-site improvements, and reconfiguration of the existing parking lot.

S. J. Amoroso constructed the project under the typical CSU design-bid-build approach under the management of the University.

During the week of May 26 and June 16, 2003, KPMG reviewed project records from the following firms involved in the project's development and execution:

Contractor:	S. J. Amoroso Construction Co., Inc. (SJA)
Architect/Engineer (A/E):	The Steinberg Group
Inspection (IOR):	United Inspection & Testing
Campus:	Office of Facilities Management (OFM)

**KPMG Construction Cost Review  
Cal State Fullerton – FU-002  
Student Housing**

**DESIGN COSTS**

The University selected The Steinberg Group as the Architect for the project. The Steinberg Group's contract dated February 9, 2000, in the amount of \$1,003,991 (including \$25,000 for reimbursable expenses) was appropriately based on the CSU fee schedule with a budget amount of \$16,249,855.

The University authorized three (3) additional services totaling \$105,447. The following is an analysis of the base contract services and extra services:

Date	Contract/Additional Services	Description	Approved	Amt. Paid	Bal. Open
9-Feb-00	Original Agreement	Base Contract	\$ 978,991	\$ 945,014	\$ 33,977
9-Feb-00	Original Agreement	Expenses	25,000	3,900	21,100
<b>Total</b>	<b>Basic Services</b>		<b>\$ 1,003,991</b>	<b>\$ 948,914</b>	<b>\$ 55,077</b>
9-Feb-00	Amendment 1	Acoustical Consultation/Design	20,900	19,646	1,254
9-Feb-00	Amendment 1	Waterproofing Consultation/Design	8,327	7,827	500
9-Feb-00	Amendment 1	Complete Fire Alarm Design	16,390	15,407	983
12-Jun-00	Amendment 2	Elevator Consultation	10,230	9,616	614
6-Aug-02	Amendment 3	Add'l On-site Observation and Construction Administration	49,600	33,400	16,200
<b>Total</b>	<b>Extras</b>		<b>\$ 105,447</b>	<b>\$ 85,896</b>	<b>\$ 19,551</b>
<b>Total</b>	<b>A/E Agreement</b>		<b>\$ 1,109,438</b>	<b>\$ 1,034,810</b>	<b>\$ 74,628</b>

At the time of our review, The Steinberg Group had not invoiced 100% of construction administration included in the base contract, or 100% of the additional services. As shown in the above table, there is an open balance of \$74,628 on the agreement and additional services.

When the project is billed out as complete and it is determined that the not-to-exceed prices for the additional services are not fully invoiced, a deductive change should be issued to close out the amendment and disencumber the allotted funds. (Guidelines related to this issue have been added to SUAM. Refer to SUAM section 9786.03.)

***Recommendation:***

None

## **CONSTRUCTION BID PROCESS**

Prior to bid, the A/E estimated the project construction costs to be \$15,000,000. The original bid date was established as December 5, 2000, which was changed to December 12, 2000 in Addendum No. 2.

Prior to bid, the four (4) following Addendums were issued:

*Addendum #1:* Issued November 28, 2000 - Clarified allowances.

*Addendum #2:* Issued November 29, 2000 - Answered requests for specification clarifications and changed the bid date from December 5, 2000, to December 12, 2000.

*Addendum #3:* Issued November 30, 2000 – Replaced Specification Section 09651.

*Addendum #4:* Issued December 7, 2000 – Answered requests for specification clarifications.

The project included provisions for four (4) allowances totaling \$475,000, all of which were credited back to the University in construction change orders. Following is an itemization of the allowances as shown in Specification Section 1020:

No. 1 - Signage Allowance \$50,000 – Provide signage allowance for use by the University to provide all interior and exterior signage as shown on drawings. The Amoroso was to coordinate the placement of signage. The University expended \$59,207.73 for signs and installation.

No. 2 – Carpet Purchasing Allowance \$300,000 – Provide carpet allowance for use by the University to purchase carpet as shown on drawings. Amoroso was responsible for installation. Actual costs spent for carpeting was \$188,471.30.

No. 3 – Kitchen Appliance Purchasing Allowance \$120,000 – Provide kitchen appliance allowance for use by the University to purchase kitchen appliances as shown on drawings. Amoroso was responsible for installation. The University expended \$59,021.95 against this allowance.

No. 4 – Toilet Accessories \$5,000 – Provide toilet accessory allowance for the public restrooms of the new Administration and the Maintenance Buildings as shown. The University will provide all toilet accessories except the grab bars and recessed toilet paper dispensers. The engineer for Student Housing purchased these accessories directly from Physical Plant and we were unable to ascertain the exact costs.

**KPMG Construction Cost Review**  
**Cal State Fullerton – FU-002**  
**Student Housing**

---

Typically allowances are included in base bids and are intended as estimates for work that become part of the project under the construction agreement. It was unusual that the contract specifications included provisions that the University would be reimbursed from the construction bid amount for costs the University would normally incur during the construction process. It appears that this could possibly be a mechanism for funding costs through the construction budget, which is unnecessary on non-state funded projects. Additionally, the inclusion of these additional costs in the base bid would result in an increase for the contractor's Payment and Performance bond costs.

The current SUAM (Section 9721.08) identifies bid allowances "as estimates for work that will be completed under the base construction contract" and further identifies acceptable allowances to include: "keying, overtime for campus staff working on utility connections, special utility permits or utility connection fees, and special inspections." It appears that these allowances may have fallen outside the intended scope of typical bid allowances. Since this was a non-state funded project it is probable that there was no need to specify allowances in the contract sum since these costs would have become a part of the normal project budgetary process and handled outside construction contract.

On future projects, the University should include bid allowances that more closely conform to SUAM guidelines.

The initial specifications listed six (6) Deductive Alternates as follows:

1. Replace 91 24" box trees as shown on drawings with 15-gallon trees.
2. Replace all integral colored concrete (#1 and #2) with natural gray concrete.
3. Replace Turfblock and sod with Grass Pave surface and hydro seed turf.
4. Replace all sod and replace with hydro seed turf.
5. Omit elephant linoleum entry design at Housing building entries and replace with a single color of linoleum.
6. Omit 7 emergency blue phones.

There were seven (7) bidders listed on the Abstract of Bids, with S. J. Amoroso being the apparent low bidder at \$18,785,000. The University executed the construction agreement on January 9, 2001, with S. J. Amoroso. None of the deductive alternates were accepted or incorporated into the original construction contract.

Additional findings related to the project include:

- The Abstract of Bids was appropriately completed and signed.
- S. J. Amoroso furnished the appropriate Payment and Performance Bonds in the original contract amount as required.
- S. J. Amoroso is a California Corporation.
- The original construction period covered 500 calendar days.
- Liquidated damages were stated to be \$1,000 per day.

**KPMG Construction Cost Review**  
**Cal State Fullerton – FU-002**  
**Student Housing**

---

- Notice to Proceed was issued on March 12, 2001 with a start date of March 26, 2001.
- Original completion was established as August 7, 2002.
- Prior to final project acceptance occupancy of two of the five housing units and the Maintenance Building occurred on July 25, 2002 as documented Change Orders 28, 29 and 30.
- On August 6, 2002, the University occupied two additional housing units and the Administration Building as documented on Change Orders 31, 32, and 33.
- The final housing unit was occupied on August 7, 2002 as shown on Change Order 34 in accordance with the original completion date.
- There was a 119-day time extension granted during project construction for work unrelated to occupancy of the housing units. A final change order provided an additional 63-day extension that allowed for a January 31, 2003 completion date.
- Notice of Completion was recorded as January 31, 2003.

***Recommendation:***

None

## **CONTRACTOR COMPLIANCE - SUBCONTRACTING PRACTICES**

The "List of Proposed Subcontractors" (CM Form 701.04) identified 20 trade divisions and subcontractors. The "Expanded List of Subcontractors" (CM Form 701.04 A) identified the same divisions and subcontractors.

S. J. Amoroso requested that Izhak's Custom Interiors be substituted with T. Maron & Associates due to Izhak's inability to obtain bonding. The substitution was properly requested by S. J. Amoroso and approved by CSU Fullerton.

We found that Cove Builders, Inc. and Continental Plumbing were substituted with Lawrence Construction and C & R Plumbing, respectively. Even though S. J. Amoroso requested the substitution and furnished letters from the subcontractors requesting their withdrawals, neither the Campus nor Amoroso could locate the required 5-day notice or the University's formal authorization for the substitution.

### ***Recommendation:***

1. The University should have formally documented their approval for the substitutions of the two above listed subcontractors and should determine whether or not Amoroso violated section 4100 of the Public Contracting Code.

### ***Campus Response:***

1. We concur. The University has contacted the two subcontractors and obtained documentation showing they initiated the request for substitution. Since these two situations are resolved and the University has demonstrated its understanding of the required process in other instances, corrective action will be considered complete once the documentation is supplied to the auditors.

As part of the bid process review, S. J. Amoroso provided the original bid files. The following trade bids were examined in detail:

- **Painting:** Seven (7) bids were received in the amounts ranging from \$235,000 to \$490,000. A subcontract was issued to the low bidder, Pecoraro Painting & Decorating, Inc., in the amount of \$235,000.
- **Roofing:** Eight (8) bids were received ranging from \$291,250 to \$369,000. A subcontract was issued to the low bidder, Coast Roofing Co., Inc. in the amount of \$291,250.
- **Demolition/Excavation/Grading:** Three (3) bids were received in amounts between \$67,200 and \$167,000. The \$67,200 by PBC was for demolition only. A subcontract was issued to J/K Excavation, in the amount of \$140,000 that covered all work.

**KPMG Construction Cost Review**  
**Cal State Fullerton – FU-002**  
**Student Housing**

---

- **Electrical:** Six (6) bids were received in amounts ranging from \$2,436,000 to \$2,950,000. A subcontract was issued to the low bidder, Mac Farlane, in the amount of \$2,436,000.

***Recommendation:***

None

**KPMG Construction Cost Review  
Cal State Fullerton – FU-002  
Student Housing**

**CONSTRUCTION CHANGE ORDERS**

Over 400 Change Order Requests (COR's) were incorporated into 63 Change Orders totaling \$2,131,322. Changes due to A/E errors and omissions totaled \$1,837,170, or 10.3% of the total contract amount, which is higher than industry averages of approximately 3% to 4% for a project of this type. Approximately 26%, or \$469,000, of the errors and omissions change orders was attributable to project accelerations and coded overtime. The coding of these changes could possibly be in error since they appear excessive and inappropriate.

As part of our review process, we sampled change orders and traced subcontractor estimates to the actual subcontractor change orders. S. J. Amoroso furnished all subcontractor files and provided a "Subcontract Status Report" that reflected each subcontract and the change orders issued against them. KPMG reviewed approximately 20 CO's totaling \$1,012,573, or 47% of the total changes. S. J. Amoroso's records were accurate and we were able to trace all sampled subcontractor quotes/backup included with the University change orders to the applicable subcontract change orders.

The University provided a log categorizing change orders by source. The following table summarizes their report:

<b>Type of Change</b>	<b>C.O. Totals</b>	<b>% of CO</b>	<b>% of Contract</b>
4.1 Errors/Omissions from the Contract Documents	1,837,170.00	86.20%	10.33%
4.2 Unforeseeable job site conditions	161,216.00	7.56%	0.91%
4.3 Regulatory agency, bldg. code, safety, health	168,674.00	7.91%	0.95%
4.4 Originated by the University	(35,738.00)	-1.68%	-0.20%
4.5 Unavailability of specified materials	0.00	0.00%	0.00%
<b>Total Change Orders</b>	<b>2,131,322.00</b>	100.00%	11.98%
Original Contract Amount	18,785,000.00		
<b>Total</b>	<b>20,916,322.00</b>		

***Recommendation:***

2. The University should determine if all E/O Changes were appropriately categorized and if they were, the University should work with CPDC (Chancellor's Office) to determine whether to pursue compensation for costs due to A/E errors and omissions. If not, the University should re-distribute the above report to more accurately reflect the reasons for the changes.

**KPMG Construction Cost Review  
Cal State Fullerton – FU-002  
Student Housing**

---

***Campus Response:***

2. We concur. Charges have been re-distributed to more accurately reflect the reasons for changes and a new report has been provided to the auditors. The percentage of cost increases attributable to errors and omissions is actually below 3%, therefore does not appear to warrant the pursuit of compensation. Corrective action is considered complete.

**Labor Fringe & Burden**

S. J. Amoroso furnished documentation to support their 53.50% burden rate for this project as well as a project previously completed this year. We found their method for calculating labor burden follows industry-standard practices and is reasonable. No adjustments were warranted. Labor burden charged was as follows:

<b>Labor Burden &amp; Fringe Analysis</b>	<b>Burden Charged</b>
Payroll Taxes – FICA	7.65%
Payroll Taxes – FUTA	0.80%
Payroll Taxes - State Unemployment	5.40%
Worker's Comp & Liability	6.71%
Overhead (401(k) and bonus accrual for mgmt.)	3.10%
<b>Subtotal Total</b>	<b>23.66%</b>
Union Costs	29.84%
<b>Subtotal Total</b>	<b>53.50%</b>

***Recommendation:***

None

**KPMG Construction Cost Review  
Cal State Fullerton – FU-002  
Student Housing**

---

**PROJECT MANAGEMENT/INSPECTION SERVICES**

The University provided in-house project management services for this project. In addition, United Testing and Inspection was awarded a service agreement on June 4, 2001, in the amount of \$292,725, which was later amended by one additional service for \$109,070. United Testing provided the following services:

Chief Inspector	\$61,875
Inspector of Record	\$174,625
OT Inspector of Record	\$37,125
Concrete Inspector	\$16,000
Testing	<u>\$3,100</u>
Total Base Contract	\$292,725
Amendment	<u>109,070</u>
Total Agreement	\$401,795

Total billings and payments against the agreement totaled \$347,457, leaving a balance of \$54,338.

As previously recommended in this report, once the final invoices are paid to United Testing and Inspection, any remaining balances should be credited back against the original agreement to close out the agreement and to disencumber unused funds.

The Offices of Facilities Planning and Design and Construction charged \$430,000 against the project totaled for in-house staff to manage the project execution. Total costs for project management and inspection services (exclusive of testing costs) were \$777,457, representing 3.7% of total construction contract.

***Recommendation:***

None

**LIQUIDATED DAMAGES**

The University took full occupancy of the housing complexes on three dates prior to the original completion date. Prior to final project acceptance, beneficial occupancy of two of the five housing units and the Maintenance Building occurred on July 25, 2002. On August 6, 2002, the University took beneficial occupancy of two additional housing units and the Administration Building. The final housing unit was occupied on August 7, 2002, as shown on Change Order 34 in accordance with the original completion date.

There was a 119-day time extension granted during construction in Change Order 37 for delays associated with the completion of Cobb Hall interior and exterior alterations, sitework, and landscaping. A final change order provided an additional 63-day extension that allowed for a January 31, 2003, completion date, which was the date that CSU Fullerton accepted the entire project. The University directed S. J. Amoroso to concentrate their labor forces specifically on the housing component of the project. They were willing to delay the tenant improvement work in Cobb Hall, which included a laundry expansion, office remodeling, weight room conversion and the convenience store in order to complete the student dorms on time. The University and the contractor mutually agreed to extend the contract completion date to January 31, 2003. Assessment of liquidated damages is therefore not applicable.

***Recommendation:***

None

**KPMG Construction Cost Review  
Cal State Fullerton – FU-002  
Student Housing**

---

**MAJOR EQUIPMENT REVIEW**

The initial review of Contract Documents and Specification was performed at the University. KPMG was furnished a submittal log and we selected our sample from that log. Submittal records were provided and reviewed at the campus.

Of the submittals reviewed, all were traced from Project Specifications to submittal data and final acceptance. A project walk-through was conducted with campus representatives in order to verify that specified and approved equipment had been provided and installed by the Contractor.

The following equipment items and specific model data were approved and visually confirmed as installed in the Housing project:

Div. #	Brand	Model #	Description
2810	Calsense	ET1 Controller	Water Management Controller
2870	Kay Park	SB 1635G	Outdoor Grill
15510	United	88H	Fire hose valves
15510	Victaulic	Series 751 FireLock	Alarm Check Valve
15450	A O Smith	Conservationist 90 PGCL-40	Gas glass-lined water heater
15450	Chicago Faucets	9007	Eye/Face Washes
15450	Elkay	EDFP 117 C	Two-level Drinking Fountain

***Recommendation:***

None

**PROJECT COST REPORTING**

KPMG conducted a review of the University's project cost reporting system and invoice processing practices. We found the practices for tracking project costs at CSU Fullerton consistent with what KPMG has found at other campuses. The Accounting Department provided numerous spreadsheets that identified contract amounts, payments processed, and any balances remaining on agreements. They also provided a total project summary for the entire project. Their reports were very useful in our review process.

***Recommendation:***

None



Office of the President  
(714) 278-3456 / Fax (714) 278-2649

RECEIVED  
UNIVERSITY AUDITOR

OCT 21 2003

THE CALIFORNIA STATE  
UNIVERSITY

**TO:** Larry Mandel  
University Auditor

**DATE:** October 17, 2003

**FROM:** Milton A. Gordon  
President *mas*

**SUBJECT:** Response for KPMG Audit Report on Student Housing Construction Project

I am pleased to forward California State University, Fullerton's official responses to the recommendations in the KPMG Audit Report on Construction Project No. FU-002 – Student Housing.

Once again, we would like to thank the KPMG Auditor and University Auditor's staff for conducting the audit in a professional manner and identifying meaningful ways to improve our construction project process controls.

The Campus Auditor, Alex Tzoumas, will also forward the responses to you electronically for your convenience. Should you have questions, please contact Alex at 714-278-5760 or [atzoumas@fullerton.edu](mailto:atzoumas@fullerton.edu).

Attachment

cc: Willie J. Hagan, Vice President for Administration  
Sherri L. Newcomb, Chief Financial Officer  
Robert L. Palmer, Vice President for Student Affairs  
Alexander G. Tzoumas, Director Internal Audit

## **CONTRACTOR COMPLIANCE - SUBCONTRACTING PRACTICES**

### ***Recommendation:***

1. The University should have formally documented their approval for the substitutions of the two above listed subcontractors and should determine whether or not Amoroso violated section 4100 of the Public Contracting Code.

### ***Campus Response:***

We concur. The University has contacted the two subcontractors and obtained documentation showing they initiated the request for substitution. Since these two situations are resolved and the University has demonstrated its understanding of the required process in other instances, corrective action will be considered complete once the documentation is supplied to the auditors.

## **CONSTRUCTION CHANGE ORDERS**

### ***Recommendation:***

2. The University should determine if all E/O Changes were appropriately categorized and if they were, the University should work with CPDC (Chancellor's Office) to determine whether to pursue compensation for costs due to A/E errors and omissions. If not, the University should re-distribute the above report to more accurately reflect the reasons for the changes.

### ***Campus Response:***

We concur. Charges have been re-distributed to more accurately reflect the reasons for changes and a new report has been provided to the auditors. The percentage of cost increases attributable to errors and omissions is actually below 3%, therefore does not appear to warrant the pursuit of compensation. Corrective action is considered complete.

THE CALIFORNIA STATE UNIVERSITY  
OFFICE OF THE CHANCELLOR

BAKERSFIELD

CHANNEL ISLANDS

CHICO

DOMINGUEZ HILLS

FRESNO

FULLERTON

HAYWARD

HUMBOLDT

LONG BEACH

LOS ANGELES

MARITIME ACADEMY

MONTEREY BAY

NORTHRIDGE

POMONA

SACRAMENTO

SAN BERNARDINO

SAN DIEGO

SAN FRANCISCO

SAN JOSE

SAN LUIS OBISPO

SAN MARCOS

SONOMA

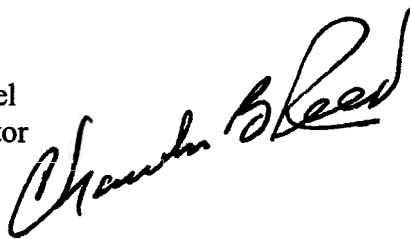
STANISLAUS

November 11, 2003

**MEMORANDUM**

TO: Mr. Larry Mandel  
University Auditor

FROM: Charles B. Reed  
Chancellor



SUBJECT: KPMG Draft Final Report on *Student Housing (Project No. FU-002)*, at California State University, Fullerton

In response to your memorandum of November 11, 2003, I accept the response as submitted with the draft final report on the *Student Housing* project at California State University, Fullerton.

CBR/ac

Enclosure

cc: Milton A. Gordon, President

Dennis Hordyk, Assistant Vice Chancellor, Financial Services

Elvyra San Juan, Assistant Vice Chancellor, CSU CPDC

Alex Tzoumas, Director of Internal Audit, CSU Fullerton

Richard P. West, Executive Vice Chancellor and Chief Financial Officer